

# **An examination of negotiation in service procurement and its application to goods and works procurement**

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**Submitted by**

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*Dedicated*

*To*

*The Departed Soul*

*Of*

*My Beloved Father*

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## **Abstract**

Introducing negotiation in goods & works procurement is very important to improving performance of the public money. Before 2003 there were no procurement regulations in Bangladesh. In fact immediate after independence, Bangladesh Forms 2908 and 2911 were used for public procurement. The Public Procurement Regulations 2003 was first introduced in September 2003 under the title “The Public Procurement Regulations 2003”. and *Jatio Sangshad* (National Parliament) had passed “The Public Procurement Act 2006”. Public Procurement Act-2006 and sub-sequent Public Procurement Rules-2008 (PPA-2006 and PPR-2008) was come into effective on January 1, 2008. So a transformational change had occurred in the field of Public Procurement after enactment of Act and Rules. All government organization now following PPR. During procuring and implementation of public works, government official have to face a lots of problem in tender processing. As estimated cost not disclosed to the bidder as well as unit price varying due to working situation the bidder fail to conceive the actual cost. So that there offered price varied from estimated cost. If the offered price above then estimated cost and procurer normally keeping the approval authority up to the estimated cost, complexity arises. Then it needs higher level approval or re-tendering which is time and cost consuming. In service procurement, it was found that minimum re-invitation or higher level approval required as there have a scope of negotiation. If there any limitation in tender processing due to fund shortage than the offered or coated price can be recast within the budget limit following some guideline. My investigation found that if there any scope of introducing negotiation in goods and work procurement process then the number of re-tender will be reduce. So that, development project will complete within limited time and budget. However, suppliers must be advised that this is the purpose of the dialogue. Variations may arise during the tendering process and the purchasing and supply management professional should ensure that all suppliers receive exactly the same information and, as far as possible, at the same time.

**Key Words:** Introducing negotiation, Procurement.

## **Declaration**

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# Chapter One

## 1.1 Intorduction

There was no Public Procurement act and rules or any uniform regulations in Bangladesh before the enactment of Public Procurement Regulations 2003. In fact immediately after independence Bangladesh inherited few customs, procedures and forms introduced by British Government and followed by public sector since then. Forms 2908 and 2911 are used for public procurement processing since our independence which were introduced in August 1929 and November 1929 by the then British Government. The Public Procurement Regulations 2003 was first introduced in September 2003 under the title “The Public Procurement Regulations 2003” with the Technical Assistance of IDA. This is the first Public Procurement Regulations of the country. Before that Public Procurement done by using various documents/ procedures like (1) the public works department code, (2) the manual of office procedure, (3) Economic Relation Division’s (ERD) guide line for donor assisted development projects, etc.. The Public Procurement Regulations 2003 replaced all of them.

In continuation of the reform process, *Jatio Sangshad* (National Parliament) passed “The Public Procurement Act’ 2006”. Public Procurement Act 2006 and sub-sequent Public Procurement Rules 2008. PPA 2006 and PPR 2008 was come into effective on January 1, 2008. So a transformational change had occurred in the field of Public Procurement after enactment of Act and Rules.

Local Government Engineering Department (LGED) is a government organization under the Ministry of Local Government Rural Development and Cooperatives (LGRD&C). It is one of the major government organizations that deal with the construction of different infrastructure/ physical facilities under different projects. LGED is the pioneer in the development of rural infrastructure of Bangladesh that has been playing a leading role in the implementation of government achieving millennium development goal (MDG). A strong base of standards and professionalism has been developed in the LGED over the



years of experience. It has prestigious accomplishment in the field of rural development through construction of roads, bridges, small scale water resource project (command area less than 1000 hectares). Primary school building, infrastructure development in urban area etc. LGED constructed some landmark structures like flyover, bridge, cyclone shelter, UP complex etc. Similarly other engineering organizations have some works that meet the national impotency as well as architectural beauty. In Bangladesh nearly 80% of national development budget spend by the engineering organizations. However, there was wide criticism against them is that they could not implement projects within stipulated budget and within predetermined time. The problems of time and cost overrun were frequently seen in different construction projects. Engineering Departments had been using so called form-2911 and form-2908 for their procurement before enactment of PPR-2003, PPA-2006 and PPR-2008. At present under these rules, procurement of service enjoying negotiation facilities, reduce time and processing cost by avoiding re-tendering the procurement process. But works and goods procurement we unable to introduce negotiation, causing delay in tender processing and re-tendering frequently. Now we can assess the impact of negotiation on works and goods procurement.

## 1.2 Scope:

Local Government Engineering Department (LGED) is the Government's biggest infrastructural development agency. Apart from the public sector, it also undertakes projects for autonomous bodies.

One of major areas of Local Government Engineering Department's (LGED) involvement is construction, repair & maintenance of rural roads and road structure, drainage & retaining structure, primary school building, local government buildings. The expenditure involved in this sector amounts to around 2500 crore taka yearly, which is substantial

This is the particular area of expenditure which will be under study during this research work, in order to find out ways of reducing tendering cost and time saving to complete the project in time.

### 1.3 Problem Identification:

The Local Government Engineering Department (LGED) is the premier development agency of the Government. One of major areas of Local Government Engineering Department (LGED)'s involvement in construction, repair & maintenance of rural roads and road structure, drainage & retaining structure, Primary school building, Local Government buildings. The expenditure involved in this sector amounts to around 2500 crore taka yearly. It creates poses an enormous challenge to the procuring entity to ensure proper utilization of public money and ensure the expenditure of ADP money in time following PPR.

In public sector of Bangladesh, implementation of the project in time or simply ensuring the proper utilization of funds for the benefit of public is a big challenge. It is therefore understood that the expenditure incurred by LGED in construction, repair & maintenance sector needs to be finalized in time, before the tendering process. Following up on these last two points, introducing negotiation in competitive tendering is widely recognized as an attractive procurement mechanism and is commonly advocated for several reasons.

Most notably it is viewed as a procedure that stimulates and promotes competition. By its nature, open competitive tendering invites potential suppliers from many venues. Furthermore, in the face of competition from many potential suppliers each one has strong incentives not to inflate his price. Indeed, fair market price discovery is often touted as a beneficial result of such tendering.

Open competitive tendering mechanisms are also known for their transparency, making it easier to prevent corruption both in the public and private sectors. These characteristics,

as well as arguments for equal opportunity, provide a justification for statutes such as the Public Procurement Rules 2008 that strongly favor the use of competitive tendering in the public sector of Bangladesh.

Interestingly, there is widespread use of both competitive tendering and negotiations in the private sector separately. For example, maximum private sector infrastructure in our country was procured using negotiations. In Bangladesh, from 2003 to 2011,  $\pm 95\%$  of private sector residential building construction for procurement in Dhaka were procured using negotiations, while only  $\pm 5\%$  were procured using open competitive tendering. The use of negotiations with single source suppliers is also common in high tech and software, for defense procurement as well. Very recently, in energy sector introduce massive negotiation for production and supply electricity to make it as early as possible bypassing PPR. So that the procurement process need minimum time. Considering above, we need to analyze whether negotiation could be used more often in public sector procurement. This research aims to do just that.

This Chapter is a framework to compare competitive tendering with negotiations and relate these award mechanisms to the payment procedures chosen in the contract. In particular, it tries to shed light on when competitive tendering with fixed price contracts will be preferred to negotiating cost plus contracts (engineering estimate). To put this Chapter in perspective it is worth observing that most of the economic analysis describes the procurement problem as follows. The supplier has information about production costs that the procurer does not have. The procurer then has to consider clever ways to infer the suppliers costs, such as offering the supplier many potential projects to choose from, and having the supplier select the one that will be produced.

In contrast, scholars and practitioners of engineering and construction management, argue that the central problem in procurement is not in implementation of the project. It lies on the tender processing, selection the right supplier, and offer cost plus contract amount.

Delay in decision making for contractor selection, re-tendering without considering the potentials of participated suppliers through negotiation hampering the project implement in time and within the estimated cost.

An illustrative example of the significance of ex post adaptation is the building of the Getty Center Art Museum in Los Angeles, which is a 24 acre, \$1 billion dollar facility that took over 8 years to construct (see Engineering New-Record 1994, 1997). The project design had to be changed due to site conditions that were hard to anticipate. The geology of the project included canyons, slide planes and earthquake fault lines, which posed numerous challenges for the team of architects and contractors. For instance, contractors “hit a slide” and unexpectedly moved 75,000 cubic yards of earth. More severely, in 1994 an earthquake struck. Cracks in the steel welds of the building’s frame caused the contractors to reassess the adequacy of the seismic design standards that were used. The project design had to be altered also due to the regulatory environment 107 items had to be added to the building’s conditional use permit. These problems were very hard to predict, both for the procurer and the contractor. However, it seems reasonable that once problems arose, the contractor had superior information regarding the costs and methods to implement changes. A more recent and much more contentious example is the “big dig” in Boston, where 12,000 changes to more than 150 design and construction contracts have led to \$1.6 billion in cost overruns, much of which can be traced back to unsatisfactory design and site conditions that differed from expectations.

These observations suggest that the procurement problem may indeed be primarily one of smoothing out or circumventing adaptations after the project begins rather than information revelation by the supplier before the project is selected. In this Chapter we argue that the form of contracts and award mechanisms can be tailored in a way to help mitigate this procurement problem. In particular, a trade-off between incentives to reduce cost and incentives to facilitate changes and share information will be the key force in our

arguments of contractual choice. We argue that simple projects, which we define as easy to design with little uncertainty about what needs to be produced, ought to be procured using fixed-price contracts, should be accompanied by high levels of design completeness (to prevent the need for adaptations), and are best awarded through competitive tendering. In contrast, complex projects, which we define as hard to design with large scope for surprises in the final configuration, ought to be procured using cost-plus contracts, should be accompanied by low levels of design completeness (implying a high chance that adaptations to the contract will be needed), and should be awarded through a negotiation with a reputable and qualified supplier. In an ongoing work if any change causes new item or cost overrun of any item more than 25% of the contract amount then we have to negotiate the unit rate for new item or excess of 25% of existing item. So that we can say that there is a minor presence of negotiation with supplier for ongoing project. This negotiating scope helps to continue the work smoothly. Similarly if we able to introduce negotiation in competitive bidding, it will help to minimize supplier selection time and help to implement the project in time. So that time & cost overrun of development project in our country achieved.

The intuition for our prescriptions stems from a tension between providing incentives to lower costs and avoiding costly and wasteful renegotiation that follows requests for changes. The strong incentives to reduce costs that are offered by fixed-price tendered contracts will lead the parties to the transaction to dissipate valuable surplus when changes need to be renegotiated. This efficiency loss will often be due to haggling over prices when there is true lock-in of the current supplier who wishes to use the need for changes to his advantage. Cost-plus contracts, in contrast, discourage cost-saving efforts but ease the process of renegotiating changes and adaptation to the contract's original requirements.

In tendering process front loaded offer from supplier is another problem creating situation. Many project stops on the half way due to poor forecasting of market price of

supplier. Negotiation with contractor about part payment system may help to overcome this problem. For example, we can decide in negotiation that part payment made according to engineer's estimate.

We continue to argue that the choice of payment procedures, such as fixed price and cost plus contracts, is tied in with the follow-up decision that a procurer faces: whether to award a procurement contract by competitive tendering with or without negotiating with a potential supplier.

While our research has been motivated by practices in the public sector, it offers implications for the private sector as well. In Bangladesh the public sector statutes that govern procurement, typically based on PPR's, strongly favor the use of competitive bidding. For example, from 2003 to 2011, more than 90% of public sector procurement using competitive bidding. Competitive bidding does have the advantage of unbiased awarding of projects, but it fails to respond optimally to ex post adaptation. This suggests that public procurement of complex projects are suffering from efficiency losses. This efficiency loss of competitive bidding may be avoided through introducing negotiation in competitive bidding.

We begin our analysis in the next section with a simple framework to describe the procurer's choice of devising a contract that will govern the procurement relationship with a selected supplier. We then continue to describe how the contracts chosen will dictate the use of award mechanisms. We conclude with a discussion of implications for business strategy and public procurement.

Discussing with Project Director, Deputy Project Director, Project Manager and Senior Assistant Engineer I found that in Local Government Engineering Department (LGED), all construction, repair & maintenance work are conceived by the departmental officers by inspecting the current status of the location or infrastructure or by the requirement of the users. The initiation process starts through the preparation of engineer's estimates,

gaining approval (both, fund – known as administrative approval and estimates – known as technical approval), preparation of specifications, floating of tenders, receiving and evaluating the tenders, approval of evaluation of tenders and contract with the successful bidder. These processes include minor sub processes along the way. Once the contract has been signed the implementation of the physical works begins which ultimately goes towards the completion of the works through the fulfillment of the obligations of all the concerned parties as stated in the contract.

Moreover, in Bangladesh the Public Procurement Rules, 2008 And Public Procurement Act 2006 are in place providing strict procedures for tendering. Hence, the implication of these rules, regulations and acts need to be analyzed specially when there are specific time limits for every action regarding tendering.

As it can be seen from the previous discussion that it is a lengthy process from the initiation to completion. The present study intends to examine the need additional involvement of senior officer for evaluation getting approval for additional cost over engineer's estimate and waste of time for tender processing. The target is to minimize time in tender processing due to marginal variation of cost by introducing negotiation. we have to find out whether these time loss can be reduced both in terms of man hours and physical costs.

#### **1.4 Background of the Study:**

By evaluating the tendering process of Local Government Engineering Department (LGED) it was found that many times we have to re-tender to make suitable contract whose proposal match the existing government rule as well as financial target as well as target contract amount. As the tender document does not carry any estimated price due to restriction of the Public Procurement Act of Bangladesh bidders coated price may not match with estimated cost. When it less then engineer's estimate then it is easy to take decision to finalize the contractor selection, but if the coated price exceed the engineer's

estimate then the approval authority change and goes to hire level, so that it consume additional cost and time. If there any scope for tendering authority to recast the lowest coated price with a little variation normally reducing through negotiation with the bidders then the evaluation time as well as re-tendering time loss can be avoided. However, as far as I know no such studies have yet been carried out in Bangladesh especially in the public sector.

Therefore, this study aims to provide an initial breakthrough in the area of time saving in the public sector tendering process by introducing negotiation in Bangladesh.

### **1.5 Research Questions:**

In view of the discussion above the following research questions have been developed;

The main research question for this study are

- a) What is the impact of negotiation in service procurement?
- b) What is the impact of negotiation in works and goods procurement?

In study, looking at the impact of PPR on the Local Government Engineering Department (LGED)'s data with those of Public Works Department (PWD) and Roads and Highways Department (RHD), in the light of the size of the contract tendered will be done to find the possible areas of time reduction by introducing negotiations during the tendering process to examine the research question / hypothesis.

The hypothesis of these research are developed as follows:

Hypothesis-1: Negotiation reduces the time and cost of service procurement.

Hypothesis-2: Negotiation will reduce the time and cost of works and goods procurement as well.



## **1.6 Methodology:**

This study intends to use detailed interview and **discussions with field officers** as the methods for collecting information. It is quite understandable that the officers involved in the preparation of estimates, floating tender and executing contract and contractor need to be interviewed. In this respect the major focus shall be on the office of the Upazila Engineer's /executive engineers of the field or ex- field officer's opinion. Also, reports from the monitoring, development and co-ordination wings of the department as well as relevant officials of those offices need to be consulted.

Consultation and discussing with procurer and supplier will emphasize on the time spent on the tendering to the execution of the contract and to determine whether more than necessary time is spent. These overrun of time may be in terms of man hour and/or other physical costs that may accrue as a result.

After collection of the information, it will be compared against each other and a generalized quantitative summary will be derived to understand the possible time and cost saving that can be achieved during the pre-contract period. This will eventually help in find out whether the hypothesis of time and cost saving in public sector tendering process is valid or not.

## **1.7 Limitations:**

Main limitations which are likely to be faced during this study will mainly be time constraint which in turn may not make the comparison of Local Government Engineering Department(LGED)'s data with those of Public Works Department

(PWD) and Roads and Highways Department (RHD) due to lack of logistic and financial support from department or institution.

Some other limitation will be the fact that the study will concentrate on the tender processing time of development and maintenance works undertaken by LGED, hence development projects and their consequences on time reduction will not come into the picture during implementation phase. Moreover, it is to be understood that there can be a minor difference from one working division to another although it may not deviate from the main purpose of the study.

## **1.8 Chapter Outline:**

The whole research work is presented in six different chapters.

The first chapter is the introduction chapter; which gives an outline of the general background of the Local Government Engineering Department (LGED) and its nature of work. This chapter also explains the scope of research work, the identification of the problem, the research question, the objective of the work, the methodology to be followed with the probable limitations.

The second chapter is the literature review chapter; which gives a generalized concept of the introducing negotiation model basing on which this research work intends to be carried out. This chapter also sets the analytical approaches needed to determine the time reduction in through negotiation in procuring goods and works.

The third chapter is negotiation in competitive tendering chapter; where an elaboration benefit of negotiation in service procurement are evaluated and from that experience the complexity reduction of the works and goods procurement and

possible way & procedure identified including the selection of suitable supplier through negotiation.

The fourth chapter is the discussion and Analysis chapter; which encompasses the introducing the negotiation in goods and works procurement. Considering the benefit of negotiation in service procurement, according the guideline of Public Procurement R regulation-2008 or PPA-2006, we can introduce it in goods and works procurement. Find the way of possible time and cost reduction during the pre contract phase. This chapter also provides the results regarding time and cost savings in conformance with the general concept of the introducing negotiation and the different merit and demerit of negotiation in different situation of public procurement.

The fifth chapter is the conclusion and summary chapter; which summarizes the findings and analysis to explain the quantifiable cost reduction in the process. This chapter also gives a guideline to the policy makers of the Local Government Engineering Department (LGED) in understanding the ways of time reduction during the pre contract phase. In addition to these this chapter also gives the limitations, assumptions and scope of further study in this field.

## **Chapter Two**

### **LITERATURE REVIEW**

#### **2.1 Theoretical overview of Negotiation**

Public procurement professionals have long had the reputation as knowledgeable bid evaluators. They can analyze the offer to determine responsiveness, conduct a technical evaluation of the bidder's capabilities, and even perform cost analysis when needed. However, more and more these same professionals are also being called upon for their negotiations skills. (Source- Bajari, Patrick and Tadelis, Steven (2001), Incentives Versus Transaction Costs: A Theory of Procurement Contracts)

As the profession sees an increased use of the request for proposal (RFP) process, there is a logical need for negotiation. A key phase of these types of procurements is negotiating the final agreement with the selected bidder. This negotiation often includes the specific terms and conditions of the contract, additional services or deliverables to be provided, as well as the final cost to the agency.

Common areas for using a negotiated procurement process include construction, and architectural services, information technology projects, and software systems. Inherent to the RFP method is the government's ability to state their problem, invite solutions from an industry, and then negotiate with one or more of the top bidders. It is not unusual for a public agency to use negotiation in their final selection. In fact, many of the firms that submit a proposal are expecting just that.

In a non-competitive or sole source environment, negotiation is also the preferred approach. Even though the supplier has a strong position with their unique expertise or proprietary product, the government is still the one “writing the check”. In some situations, such as a formal bid invitation, negotiation may be prohibited by statute or regulation. This helps to protect the integrity of the procurement process. Even if the procurement does not involve negotiation as part of the selection process, it is still surrounded by opportunity. After all, aren't changes in the work schedule or product substitutions open for discussion? In many cases, the procurement professional can barter a deal between the contractor and the using department. Having strong negotiation skills will help ensure a win-win outcome.

Daily interactions with other business units are often a negotiation. Areas such as agency training, procurement system enhancements, and even administrative support are prime opportunities to sharpen one's negotiation skills.

Traditionally, other business units have taken the lead in contractor negotiations, with the procurement professional brought in later to formalize the agreement. While being involved with the process is certainly a start, it is ideal when procurement can lead the negotiations. If public procurement professionals are serious about bringing their “A game” to the table, they should realize the value of negotiation. Participating in professional training and in agency contract negotiations is invaluable.

According to the Community and national legislation, "negotiated procedure means the procedure whereby the Contracting Authorities consult the economic operators of their choice and negotiate the terms of the contract with one or more of these." in the negotiated procedure, "Contracting Authorities shall negotiate with

bidders the tenders submitted by them in order to adapt them to the requirements which they have set out in the contract notice, the tender documents and the additional documents, if any, and to seek out the best tender." In this procedure, the Contracting Authority should determine in the tender documents the individual negotiation steps and the terms to be the subject of negotiations. (Source- Bajari, Patrick and Tadelis, Steven (2001), Incentives Versus Transaction Costs: A Theory of Procurement Contracts)

Negotiation in the purchasing process covers the period from when the first communication is made between the purchasing buyer and the supplier through to the final signing of the contract. Negotiation can be as simple as trying to obtain a discount on a case of safety gloves through to the complexities of major capital purchases. A purchasing professional must aim to be successful in their negotiations with suppliers to obtain the best price with the best conditions for every item that is purchased.

## **2.2 Negotiation in service procurement**

In PPR, for service procurement there is a stage of negotiation to finalized financial proposal where keeping the remuneration part intact, procurer and service provider negotiated with reaffixing the scope of work, logistic support. Other fringe benefit including government tax collection ret \$ amount. It also negotiates the please posting, working condition number of field visit, transportation facilities, office accommodation etc. So that if there is any ambiguity between procurer and supplier that would be removed and providing service goes accordingly.

In The Public Procurement Rules 2008 has the following guidelines about negotiation.

Negotiations. |— (1) upon completion of the Evaluation of the Proposals, a PEC shall -

(a) in the case of Quality and Cost Based Selection (QCBS) Method, review the combined Technical and Financial Evaluation Report and invite the Consultant that scored the highest in the combined Technical and Financial Evaluations for negotiations;

(b) in the case of Fixed Budget Selection (FBS) Method, invite the Consultant that submitted the highest ranked Technical Proposal within the budget for negotiations;

(c) in the case of the Least Cost Selection (LCS) Method, invite the Consultant that quoted the lowest price among those who passed the minimum technical points for negotiations.

(2) The Procuring Entity shall notify the successful Consultant that its Proposal has been accepted and shall set a date for the commencement of Contract negotiations so that the Contract can come into force before the prescribed Proposal validity date expires.

(3) A Proposal Evaluation Committee shall, in order to conclude a Contract, negotiate with the successful Consultant only on the following components of its Proposal:

(a) Methodology;

(b) Work plan and activity schedule;

(c) Organization and staffing;

(d) Deliverables;

(e) Training inputs, if training is a major component;

(f) Client or Procuring Entity's inputs;

(g) Reimbursable, in the case of time-based Contracts; and

(h) Proposed Contract price.

(4) A PEC shall neither seek nor permit changes in the rates quoted for staff remuneration proposed by an Applicant in selection methods where the Applicant's price is used as a factor in the evaluation.

(5) The PEC may require the consultant to substitute a key staff, if it was found during

Evaluation that he is not fit enough for the proposed assignment.

(6) If an extension of validity of proposals was the reason that key staff were not available for a Firm, a change of key staff with equivalent or better qualification may be permitted.

(7) During negotiations special attention shall be paid to defining clearly the inputs and facilities offered by the Procuring Entity.

(8) Negotiations shall include discussions about the TOR but shall not significantly alter the original TOR so that the integrity of the negotiations and the content and findings of the technical Evaluation Report cannot be called into question.

(9) Major reductions in work inputs shall not be made solely to meet the budget. (PPR 2008).

## **2.3 The Contracting Framework**

Contractual Components-Design and Incentives. In this section we discuss and analyze the precursor to awarding a contract: devising one. Consider a procurer who wishes to procure a project (good or works) from a supplier. To facilitate the procurement and get what he desires, the procurer must provide the supplier with plans and specifications that describe the project and kept an engineer's estimate. This is the procurer's first dimension of contractual choice: how much design costs to invest at the onset, where more investment (and costs) in design



creates a more detailed set of plans, specifications and more market based engineer's estimate. Clearly, a more detailed and accurate design of a project reduces the possibility of negotiating changes after the project starts taking shape. It is often prohibitively expensive to draft a complete design that includes all the relevant blueprints and \$ engineer's estimate or Bill Of Quantities(BOQ) instructions that fully describe the project exactly as the procurer's needs dictate. That is, there is always a chance that a contingency will arise for which their are no engineer's estimate are insufficient. This in turn implies that the plan as specified may not result in the successful completion of the procurement process, and the procurer may not obtain the value he initially expected. We refer to this problem as poor engineer's estimate because it is generally associated with the market price not being match with bidding price. So that procurer have to negotiate with supplier to minimize the gap between engineer's estimate and offered price which will save time from re-tendering.

The poor engineer's estimate of the project will depend not only on how much investment in engineer's estimate was initially performed, but will also depend on how prone the market price of construction methods project is to unforeseen changes. Such unforeseen changes can arise from un availability or currencies fluctuation for imported goods that are just to hard to predict or plan for, or alternatively too expensive to try and draft onto the engineer's estimate. To overcome this, problem considering the complexity of the project as how expensive it is to provide negotiation with lowest bidders rather than market based engineer's estimate preparation. The more complex a project is the more expensive it will be to try and prevent market based engineer's estimate. Thus, the procurer's first choice is how complete a market based engineer's estimate to invest in while being aware of the costs of variable components that can affect the

project's bidding activities. Most procurement contracts are variants of simple fixed-price or cost-plus contracts. In fixed price contracts (up to 20 million Taka), the procurer offers the supplier a pre-specified price for completing the project as specified, and any changes in % are coated in the tender documents. Normally offered price are below or equal to engineer's estimate and no negotiation is required. A variable (more than 20 million Taka) contract does not specify a price, but compare the bidding price with engineer's estimate. If offered price less than engineer's estimate, contract formed without any question, but if the offered price exceed the engineer's estimate then it needs approval from heir authority. Sometimes the decision goes in favor of re-tendering, but both are time consuming.

## 2.4 The costs and benefits of Negotiation

We are now in a position to highlight some tradeoffs of using either payment structure. Let us start by ignoring first any changes to the original engineer's estimate, and assume that the project will be executed exactly within engineer's estimate. If a fixed-price contract is in place then the supplier bears all of the costs of providing the project. This, of course, implies that the supplier has strong negotiation to lower the cost of production, and some of these would pass on to the procurer through negotiation (that we discuss more in the next section). In contrast, if a market based contract where estimated cost are unknown to supplier, it is not easy to predict the actual cost by following design and specification. So that in this situation then the supplier knows that any extra costs he incurs will be fully compensated for, and may even generate a small profit if the fee is based on a percentage of the costs. If the coated price exceeded the estimated price which is matched the market price then the supplier will have to negotiate to reduce the costs of production, and such costs savings can therefore be transferred to the

procurer. To set a benchmark imagines an idealized situation where the engineer's estimate of the project leaves no room for market based variations. For example, imagine that all the engineer's estimate of the project are completely clear and well documented, and match with market price which is easy to verify upon delivery. For this idealized case the observations discussed earlier lead to an obvious conclusion:

**Situation 1: If engineer's estimate is clear and match with market price and if it is less than 20m taka then favor fixed-price contracts.**

This simple observation is a direct consequence of the fixed price provided by each of the two payment structures. In PPR there is a provision for the project cost are below or equal to twenty million having clear specification, the official estimate is fixed and the supplier will only cost the percent less or above. Dimension of interest to the procurer is the cost, then clearly one wants to achieve the lowest possible cost, and this is achieved by providing the supplier with the strongest possible incentives to lower costs. Notice, however, that two qualifications were stated in practical. The first qualification is that **engineer's estimate is clear** due to project cost are below or equal to twenty million having clear specification. This means that the procurer can avoid the need to ask for any changes or modifications after the project commences, and no redrafting or renegotiating will be needed to complete the project according to the procurer's needs. The second qualification is that project cost is above twenty million having clear specification/ not. This means that the procurer can easily detect any departures from the design and specification as well as any shortfalls like budget shortage especially in case of LGED that deviate from the specified requirements. Furthermore, the fact that performance can be verified means that

any such deviations from the design and specifications can be used as negotiate with the supplier. This guarantees that if the supplier wishes to receive payment, he must satisfy all the requirements that meet the procurer's needs according to negotiated terms and condition of the job.

Situation 2: If it is impossible or extremely costly to contractually verify important performance measures, and if the contractor can save on costs by cutting back on these performance dimensions, then favor negotiation.

Practical Conclusion 2 resonates with the old saying of “you get what you pay for”. If the supplier is bound to a fixed price contract he will, as mentioned earlier, have strong incentives to cut on costs. When cutting corners is one way to achieve costs savings, then it better be easy to deter such behavior if the procurer is harmed by it. This simple observation is often recognized by practitioners, but when ignored, can lead to extremely undesirable outcomes. Thus, negotiation contracts have merits by inhibiting a supplier's incentives to cut costs by cutting back on important, yet hard to monitor performance dimensions. It turns out that negotiation contracts have another appealing feature, which has been recognized at least by some scholars and practitioners in the area of construction management: facilitating changes and modifications to the original designs and specifications. In another word if there any scope of negotiation with bidders, it will help to minimize time loss so that the project will complete in time.

For example, the most common sources of changes in building construction are defective plans and specifications, changes in project scope and differing conditions than expected at the site of construction. In other words, any change

will often lead to the need for renegotiating the original specifications of the project as well as implementation cost and time.

Conventional wisdom in the industry is that negotiated contracts are better suited to facilitate such change and to reduce the amount of adversarial relations and frictions between the procurer and the supplier when such changes are required. To see why, imagine a situation where at some advanced stage of the project's development it turned out that the plans and specifications are defective, or lacking some directive for an unforeseen issue that arises.

Consider the effects of having a fixed price contract in place when the procurer asks the supplier to adopt some changes to the original plan. The original plans and fixed price compensation take the form of a specific-performance contract that binds the supplier to the original plans and does not oblige him to agree to the changes proposed by the procurer. Thus, the procurer will have to negotiate any changes with the supplier. The procurer's objective is to get the changes done in the most cost effective way according to his needs while the supplier wishes to make as high a profit as he can from the potential windfall. The supplier would like to take advantage of this situation since he is in a unique position of being able to hold up the procurer as a consequence of being in the midst of the project, and has no competitive pressure to discipline his behavior. Knowing this, the procurer may expect to be overcharged and the two parties are likely to engage in contentious adversarial negotiations. Alternatively, consider the effects of having a negotiating scope for cost plus contract in place when the procurer asks the supplier to adopt some changes to the original plan. Unlike the specific-performance nature of a fixed price contract, a cost plus contract effectively has a built in mechanism to compensate the supplier for any changes that are required. Namely, any additional costs that the supplier incurs are automatically

compensated for through the cost-plus structure. In other words, the presence of negotiation for cost adjusting serves as a lubricant for minimize the contractual time and implementing cost of the project and cooperative implementation of changes when contractual incompleteness gives rise to the need for changes.

Situation 3: If engineer's estimate and bidders price very marginally and the need for flexibility to implement changes is important for contractor selection through negotiation within limited budget.

We can now conclude this section with a recommendation that follows from the trade-offs between reducing the offered price within engineer's estimate or re-tender, by negotiation with lowest bidder. Recall that a project is said to be complex if the procurer anticipates it to be difficult to describe, specify and monitor, so that a rather complete design will be exceptionally costly to provide (or maybe even impossible) so that the tender documents are not clear to the supplier, then it is better to select contractor and finalize contract price through negotiation . In contrast, a project is simple if it is easy and rather inexpensive to design and it is straightforward to predict and monitor performance. Since the costs of design and engineering efforts are an integral part of the total project costs we can conclude our recommendations as follows:

Situation 4: For simple projects favor a complete investment in design and specification followed by a fixed-price contract, while for complex projects favor a low investment in design followed by negotiated contract.

It is worth explaining the reason for favoring savings on design for complex projects. At first it may seem that complex projects would require an extra effort in trying to provide more details into the design. However, the complexity of such projects implies that many changes are expected even if design efforts are high. Thus, if a cost-plus contract is in place and negotiation is a part of contract agreement to deal with such changes, the added benefits of extra design efforts are small. This follows because it will not be too costly to implement changes in the aftermath of unforeseen issues, which makes the benefits of a more complete design less pronounced. A caveat is that one would wish to avoid changes that will completely disrupt the projects production plan and cause expensive changes to the infrastructure as it develops. Thus, some initial investment in planning will be necessary to predict how complete the design ought to be to at least set the stage for proceeding with the project as well as making effective negotiation with supplier for time and money saving.

Now that we have set up the contractual framework and offered some insights about the trade-offs facing our procurer in designing the contract's structure, we proceed to explore the connection between the contract's structure and the award mechanisms that the procurer can choose.(Source-Incentives and Award Procedures: Competitive Tendering vs. Negotiations in Procurement)

## **CHAPTER-3**

### **3.1 Negotiations in Competitive Tendering.**

In post tender negotiation provided it is undertaken professionally and ethically, we believe that post tender negotiation is an appropriate process to secure value for money. It is the responsibility of the purchasing and supply management professional to determine whether, for any particular contract, post tender negotiation should be undertaken. We suggests that bid clarification i.e. detailed discussion about the offer, should usually comprise the final stage after receipt of tenders and before contract award; it will normally lead to improved value being obtained. This is because there are often points in the tender which need to be clarified. It may also be necessary to undertake bid clarification with several suppliers, for example if a bid appears especially low, or especially high on price. During bid clarification, discussion might take place around the specification or delivery period for example. This may lead to negotiation on terms and conditions, warranties, payment terms or price. It is important however, that during this process of negotiation, the changed offer does not alter the competition. Where the negotiation is taking place with the clear winner, as judged against the preset selection criteria, it would not matter if the outcome dramatically changed. The problem arises where for instance, three suppliers are undergoing a process of bid clarification and negotiation and the third most attractive offer suddenly changes substantially. It is important in this case to allow all suppliers access to the same information and the same opportunity to review their proposals. Expert of procurements believes that during post tender negotiation on price, suppliers must be treated fairly and courteously. The person responsible for negotiating should be the purchasing and supply management professional, but where this is not the case,



it is their responsibility to ensure that the negotiator conducts the negotiation on a professional basis. Post tender negotiation is a key skill of the purchasing and supply management professional and, like other aspects of negotiation, the expert of procurements believes that the purchasing and supply management professional should undertake a refresher training course, once every five years. (Source-Bajari, Patrick and Tadelis, Incentives and Award Procedures: Competitive Tendering vs. Negotiations in Procurement)

We proceed to argue that the choice of a contract's payment structure should be tied to the choice of award mechanism, namely, the choice between a process of competitive tendering and a negotiation with a selected supplier. To set the stage, recall the many known benefits of competitive tendering. First, it promotes competition among potential suppliers. Second, it offers a kind of transparency that helps mitigate favoritism and corruption. The question is then, what is the object over which bids are solicited and what form should these bids take? Consider our contractual framework and imagine that a simple project is at stake where our procurer follows Situation-4 and chooses to invest in a rather complete design that is accompanied by a fixed-price contract. This implies that our procurer is in a position to give a very detailed description of the project to potential suppliers, and all the procurer wishes to receive in return is a single price that will be paid once the project is completed according to the plans and specifications. In this situation a competitive tendering mechanism will offer the procurer all its benefits. Suppliers will have to compete their surplus away, and the procurer is getting exactly what he wants: a well defined project at the lowest possible price. If the procurer instead chooses to negotiate a price with a single supplier, the competitive pressure is

weak and the procurer will not achieve all the possible cost-savings that he can. Therefore we conclude:

**Situation 5:** For simple well specified projects favor a fixed-price contract to be awarded by a competitive tender.

Now turn to the other case of a complex project with an incomplete design and which the procurer plans to award using a cost-plus contract where cost means engineer's estimate and plus means additional claim by the supplier over engineer's estimate. As most practitioners would readily agree, "[a] cost-plus contract does not lend itself well to competitive bidding," and in the area of construction management, "most negotiated contracts are of the cost-plus-fee type." To try and implement a competitive tender for a cost-plus contract after open bidding the cost of the project will determine from the coated price of the contractors, and then one might suggest that bidders then provide their bids over the "plus" portion of the compensation. In this way the procurer can choose the supplier who requests the lowest compensation for his management, if necessary to reduce the plus portion, procurer can negotiate with suppliers and the production costs of labor and material will be automatically paid for through the cost-plus structure. However, as the "plus" is often only a small fraction of the costs, any change of the design or work volume can be readjust by cost-plus structure so that negotiation can be suitable way to select a contractor for what is in essence a challenging and complex project and time can be saved by avoiding heir level approval, re-tendering process or both. (Source- Bajari, Patrick and Tadelis, Incentives and Award Procedures: Competitive Tendering vs. Negotiations in Procurement)

To see this we begin by considering what will determine a supplier's desired compensation when bidding for a contract. Clearly, a supplier will not wish to settle for less than he could obtain in some alternative job. If, as one would imagine, more cost efficient and able suppliers have better alternative opportunities, then their bid for a fee in a cost-plus contract will be higher than less able and cost efficient suppliers. This argument implies that is the highest cost and least able supplier who will win such a competitive tender for a cost-plus fee. Furthermore, if complex projects that are tied to cost plus contracts require suppliers that have more expertise, then hiring the least able supplier can be devastating. Instead of using a competitive tender the procurer can search the market for those able and reputable suppliers and choose one to negotiate with in order to set the fee for the cost-plus contract. So that it will provide extra benefit of the competitive bidding advantage to the procurement entity. In this way the procurer guarantees himself a qualified and able supplier with minimum time and cost. Furthermore, since the fee is expected to be a small fraction of the costs, the lack of competitive pressure on the supplier will not have a large effect on final costs. (Source- Bajari, Patrick and Tadelis, Incentives and Award Procedures: Competitive Tendering vs. Negotiations in Procurement)

Situation 6: For complex and incompletely specified projects favor a competitive bidding – plus negotiation contract to be awarded using a negotiation with a suitable supplier.

We have described a link between the choice of contractual payment structure and the way in which such contracts ought to be awarded. As it turns out, there is a complementary reason to favor negotiations with a

suitable supplier over tendering when complex projects are to be awarded. Practitioners have recognized that competitive tendering stifles valuable coordination between the procurer and the potential supplier before the plans and specifications are finalized. To see this note that the primary information that the procurer receives from suppliers in a competitive tender is their bid. A supplier has no incentive to offer the procurer advice on how to improve the plans or avoid certain pitfalls. In fact, a supplier would have the incentive to keep any findings of this kind to himself as they offer him a competitive advantage over his rivals in a competitive tendering process. For example, it is widely believed in the construction industry that when competitive tendering is used to award a fixed-price contract, the contractors strategically read the plans and specifications to determine where they will fail. Suppose that some contractor sees a flaw in the plans that will cause a change leading to 10 million taka of profits, and that the other contractors do not. Our savvy contractor will likely win the job since he would be willing to bid less than contractors who do not see the flaws in the plans. Competitive tendering may therefore lead to a problem of ex-ante opportunism that is more problematic when projects are complex. After he is awarded the project, the pitfalls he anticipated will materialize and he will be in a position to reap excessive profits from the required changes. In negotiations, however, the procurer and supplier typically spend a good deal of time discussing the project before contract formed between procurer and supplier. During such negotiations the procurer can elicit the supplier's views about where the designs and specifications can be improved, so that negotiations might be preferable to competitive tendering. The construction industry literature suggests that one merit of cost plus contracting and negotiation is that procurers and contractors spend more time discussing the project and ironing out possible pitfalls before work begins. Thus, we conclude:

Situation 7: In a complex projects for which the expertise and input of an experienced supplier is essential at the design stage, favor a cost-plus contract to be awarded using a negotiation with a short listed suitable supplier.

We conclude this section with some insights and recommendations for projects that are not clearly categorized as very simple or complex, and for which the choice of contract structure and award procedure is not obvious. Consider the effects of market conditions on the choice of contracts and award procedures. It is well known that the benefits from a competitive tender will generally depend on the number of qualified bidders who will participate. In particular, the more potential suppliers are available for bidding, the higher the benefits from promoting competition. We have:

Situation 8: In a moderately complex projects where specification at moderate costs, if there is more potential competition then favor a more complete design and a fixed price contract to be awarded using a competitive tender. If potential suppliers are scarce then save on design costs and favor a cost-plus negotiated contract with a qualified supplier.

Finally, we consider the difference between an open competitive tender in which any supplier can submit a bid to the procedure of “invited bidders” in which only a handful of suppliers are invited to participate in the competitive tender. To analyze potential differences between these procedures consider the response of suppliers to a request for bids for a rather complex, but somewhat well specified project. Preparing the bid will be more challenging and costly the more complex and large the project is. If qualified suppliers expect that less qualified suppliers may try to

compete and offer low bids, then they also may try to compete and offer low bids, so that qualified suppliers will be available for contract no negotiation is essential.

Hence, a procurer may not be able to attract qualified suppliers if price competition is expected to be fierce. If the procurer can prevent less qualified suppliers from bidding and in this way restrict competition to guarantee a reasonable rate of return then the qualified suppliers will have incentives to invest in preparing these bids and compete. In this situation the offered price may far from expectation as well as actual cost, where negotiation is very important. It will help to establish cost plus contract. Thus, for moderately complex projects for which several qualified bidders exist, and for which preparing bids includes significant costs on the suppliers, favor a fixed price contract to be awarded by inviting a small number of qualified suppliers to a competitive tender. Contract can be finalized through negotiation to save the procurement time and cost of contract. (Source-Bajari, Patrick and Tadelis, Incentives and Award Procedures: Competitive Tendering vs. Negotiations in Procurement)

## **CHAPTER-4**

### **4.1 Lessons for Business Strategy**

The widespread benefits offered by competitive tendering to set a project's price are well known: promoting competition and hampering corruption. We have shed some light, however, on some of the costs of using this popular mechanism. In fact, in a recent study of contracts awarded in the construction industry in Northern California it was found that in the private sector there is widespread use of negotiations. Specifically, more than 43% of over 4,000 private sector contracts between 1995 and 2000 were awarded using negotiations with a sole supplier, while only 18% were awarded using open competitive tendering (most of the rest were awarded using a select group of invited bidders which is also a part of negotiation). An analysis of the data suggests that the choices made are consistent with the trade-offs we have laid out in our analysis above. As we have argued, there are two channels through which cost-plus negotiation contracts where cost base may be change during negotiation and the contract awarded through negotiation can be more attractive than fixed-price contracts awarded through competitive tendering. The first is the need for flexibility and changes to incompletely specified designs of complex projects. A response to this problem is choosing a cost-plus contract that cannot be competitively tendered in a sensible way. The second channel, which has been emphasized by some industry participants, is using the knowledge and experience of a contractor before the designs are complete and construction begins. As we have argued, if a project will be awarded using competitive bidding then a contractor has an incentive to hide information about possible design flaws, submit a low bid, and recoup profits when changes will be required.

Again we can consider the problem below, where the procurement problem we investigate is generally applicable, be that of an auto- mobile manufacturer who needs to procure a braking system, an accounting firm who needs to procure information technology services, or a city government that needs to provide garbage collection and disposal services for its residents. This problem is also related to the “make-or-buy” problem of the organization of production, which is the choice of which activities to produce oneself, and which to outsource to an external supplier. If we consider the procurement of goods and services that are repeated over time, then we can view internal organization and self production as buying the time of employees and paying directly for the input materials, much like a sequence of cost-plus contracts (where the fee is comparatively high, so that funds are not spent but absorbed as part of the organization’s profits). Alternatively outsourcing transactions for a predetermined price that depends on output performance.

Our analysis suggests that for long term and steady provision, goods and works that are simple in our contractual framework should be outsourced with fixed-price contracts. As supplier for such product is available, hard negotiation is very effective. While goods and works that are complex and plus is comparatively higher margin, should be internally produced as if they are procured with a cost-plus contract. It will create pressure over supplier to reduce their profit margin during negotiation and procurer will be benefited due to position in upper hand. The benefits of internal production are also that the procurer retains control over the process, which may indeed be a valuable option when complex issues are at hand and direction and flexibility are needed throughout the process of production. Casual observation suggests that in many cases employees have directives that specify their work, but these are often



verbal and not specified in a detailed contract. Outside contractors are subject to very detailed contracts and contractual compliance is measured *vis-a-vis* these formal specifications. But prepare a detail specification is not always easy. It takes a lot of time and cost. But by introducing negotiation we can able to readjust the terms and condition as well as bidding amount which is beyond the limit of inviting authority.

## **4.2 Lessons for Public Sector Policy**

In the public sector, statutes such as the PPR strongly favor the use of competitive bidding, and particularly open competitive bidding when feasible. For instance, in our study of the construction industry in public sector like LGED, RHD, PWD etc mentioned above that 98% of the projects awarded in the public sector were awarded using open competitive bidding as compared to very few in the private sector. As private sector firms are more sensitive to cost and time minimization, it is reasonable to conclude that their behavior is more responsive to optimal choices.

As mentioned above, competitive bidding is perceived to select the lowest cost bidder, prevent corruption and favoritism that are opposed to efficiency, and it offers a clear yardstick with which to compare offers. According to an Ohio Court, competitive bidding “...gives everyone an equal chance to bid, eliminates collusion, and saves taxpayers’ money... It fosters honest competition in order to obtain the best work and supplies at the lowest possible price because taxpayers’ money is being used. It is also necessary to guard against favoritism, impudence, extravagance, fraud and corruption.” This is the main rational for requiring competitive tendering in the public sector.

Our results suggest that for complex projects, there is a downside to the use of fixed-price contracts awarded through competitive tendering and that selecting a contractor and negotiating with him may be the favorable course of action. This downside of open competitive bidding can arise from a lack of input by contractors at the design stage, from the need to proceed quickly without the ability to complete detailed plans and specifications, and from the expectations that ex post haggling and frictions might occur when changes are needed. An important practical question for public procurement is whether one can design a set of objective rules for awarding negotiated contracts that minimize transaction costs, but that are not easily subject to manipulation, corruption, or blatant favoritism.

The design of novel rules that on one hand allow the use of flexible-cost plus negotiation contracts while on the other hand offer some controls that reduce the possible scope of opportunistic behavior is beyond the scope of this article. That said, our analysis suggests that there may be large gains and savings of tax-payers' money from designing and successfully implementing cost-plus negotiations in the public sector with better controls. Considering all, it is clear combined effect of competitive bidding and cost plus negotiation will improve the quality of spending of public money. It will help to implement the development project in time with minimum cost as well as ensuring the quality of works.

### **4.3 Discussions and Analysis**

When engineer's estimate is clear, match with market price and less than 20m taka then in LGED follow Limited Tendering Method (LTM). In LTM bidders can offer bid price  $\pm 5\%$  of engineer's estimate which belongs to fixed-price contract. But if the Job is complicated and engineer's estimate not match with market price then

they follow the Open Tendering Method (OTM). But in this situation OTM only apply for re-tendering. If there any scope of negotiation in PPR then LGED can negotiate with bidder about complexity and market price of the works. So that  $\pm 5\%$  bar for coated price followed by re-tendering need not required. As a result bidding process will required shorter time period.

Some times LGED implement some odd job which are not regular and impossible or extremely costly to contractually verify important performance measures. Due dissimilarity with the regular job, in this situation LGED look for a capable, experience contractor who is fit for work. So that the contractor can save on costs by cutting back on these performance dimensions, then favor negotiation. At present they go through normal process causing criticality in implementation and time consume a lots.

If engineer's estimate and bidders price very marginally and the need for flexibility to implement changes is important for contractor selection through negotiation within limited budget. But at present LGED normally go for re-tender or reduce the scope the work.

It is suitable for simple projects that favor a complete investment in design and specification followed by a fixed-price contract, while for complex and incompletely specified projects favor a low investment in design followed by negotiated contract. Due to absent of negotiation in bidding process at present LGED go for a complete investment in design and specification followed by a fixed-price or bidder's price contract for both simple and complex works. So that the total cost of the works goes up.

In a complex projects for which the expertise and input of an experienced supplier is essential at the design stage, favor a cost-plus contract to be awarded using a negotiation with a short listed suitable supplier. But at present LGED do the job through multiple stages. For example, in case of Moghbazar-Mouchak flyover, traffic pattern and their movement study, detail design and engineering estimate prepared separately by a service contract. Now they made some contract with service provider and implementing agency to execute the works. So that it will take a handsome amount of time to complete the job. If there any scope of negotiation in PPR exist then LGED may choose the a cost-plus contract to be awarded using a negotiation with a short listed suitable supplier for such complex projects.

## **CHAPTER-5**

### **5.1 Conclusion and Recommendations**

#### **Conclusion**

Tendering and post tender negotiation are fundamental purchasing and supply management skills which must be executed professionally and ethically in order to obtain best value for money. This document has described the principles and processes of good practice in respect of the above but does not intend to be prescriptive. In particular, purchasing and supply management professionals in the utilities and public sectors must ensure compliance with the public procurement rules. Expert personnel suggest and recommends that purchasing and supply management professionals adopt the principles of good practice but define and develop their own signature purchasing processes which are best suited to their own organizations and reflect the sectors, industries and markets in which their organizations are positioned.

Invitation of tender and supplier selection is an important component of procurement. In implementation a project in time & budget is a great challenge. At the same time the selection of a qualified supplier is another challenge. In LGED we found that the selection of a service provider takes marginal time if there responsive service provider are available. Because, if there any deviation about service hour (man month) of coated price that can be modified keeping the unit price unchanged. This is only possible due to presence of negotiation between service provider and the procure entity. Getting the responsive offers it is rare case of re-invitation for proposal only for financial offer deviates from the estimates. In

an ongoing project due to unavoidable circumstance or betterment of the work we have to change our design as well as bill of quantities. To implement the non tendered item and non tendered item more than engineer's estimate we go through negotiation with supplier. This is because, separating the work from original quantity is some times not possible, critical, not justified and time & cost consuming.

## **Recommendations**

From the above discussion it is clear that negotiations are present in our procurement rules. It plays a vital role in both service procurements and work procurement when the works are ongoing stage. Considering all we can say proper introduction of negotiation process in procurement will also improve our works and goods procurement like service procurement. It will help to implement the project within stipulated time and thus reduce total cost. It will reduce the haggle of re-tendering or getting the approval from higher authority. Executives are able to implement the project smoothly. For example in LGED, like others Procuring Entity (PE), district /upazila executives are able to finalize the contract within the estimated cost. But if the coated price exceed estimated cost, up to 15% he/she need to get approval from Head Of Procuring Entity (HOPE) means departmental head and for more then 15% above approval comes from ministry. Again re-tendering process also more critical, because only HOPE have the capacity to given approval for re-tendering, what ever the situation. Higher level approval and re-tendering both are time consuming process. It reduces the working time; expand the project duration and cost overrun. If government introduce negotiation in works and goods procurement, in many cases re-tendering and higher level approval can be avoided. For example, in a tendering process of LGED or any other department lowest responsive bidders coated price may 0.12% above

estimated price as the estimated price disclosed after tender receiving. According to PPR it needs the approval from HOPE which is time consuming. If there any scope of negotiation in PPR between PE and lowest competitive and responsive bidder then the bidder may accept the PE's offer to do the job at estimated price. Because time loss for approval from HOPE may cause cost escalation of construction material from which he/she may suffer more loss. Now tender/ re-tender process takes more or less 90days for bidder selection. A minor change in bidder capacity may create the lowest bidders bids as technically responsive. In this situation negotiation may play a vital role to identify a prospective bidder as well as reduce the probability of re-tendering. As negotiation is a both way communication it also helpful for quality works. Again negotiation in procurements between bidders and procurer creates good relation and understanding. Every party is able to understand the expectation of other parties and act accordingly. So that they are satisfied up to highest level as their expectation fulfilled. It is the ultimate target of project implementation.

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